

Amendments to the Claims:

The text of all pending claims, (including withdrawn claims) is set forth below. Cancelled and not entered claims are indicated with claim number and status only. The claims as listed below show added text with underlining and deleted text with ~~strikethrough~~. The status of each claim is indicated with one of (original), (currently amended), (cancelled), (withdrawn), (new), (previously presented), or (not entered).

1. (currently amended) A transmission apparatus used for forming a ring network that supports a bidirectional ring switching capability, the transmission apparatus comprising:
 - a detecting part detecting a ring switching request from a received signal, including identifiers of transmission apparatuses between which a failure occurs, wherein the ring switching request is sent from one of the transmission apparatuses that detects the failure, and at least one of the transmission apparatuses performs line switching after receiving the ring switching request that goes around the ring network;
 - a storing part storing a concatenation setting information table that includes concatenation setting information for each identifier of transmission apparatuses forming the network;
 - an obtaining part obtaining an identifier from the ring switching request and concatenation setting information, corresponding to the identifier, from the concatenation setting information table;
 - a setting part making a concatenation setting for a protection line according to the concatenation setting information;
 - a detecting part detecting a concatenation setting in the transmission apparatus; and
 - a sending part adding the respective identifier of the transmission apparatus to concatenation setting information corresponding to the concatenation setting and sending the concatenation setting information with the respective identifier to another transmission apparatus by using available bits in an undefined region in an overhead of a signal transmitted over the ring network, wherein the concatenation setting information is for connecting basic unit signals transmitted over the ring network.

2. (cancelled)

3. (original) The transmission apparatus as claimed in claim 1, wherein the

obtaining part obtains the concatenation setting information from information received from another transmission apparatus.

4. (cancelled)

5. (previously presented) The transmission apparatus as claimed in claim 1, wherein, when the respective identifier is changed, the sending part adds the changed identifier to the concatenation setting information and sends the concatenation setting information with the changed identifier to another transmission apparatus.

6. (previously presented) The transmission apparatus as claimed in claim 1, the transmission apparatus further comprising:

a part adding the respective identifier to first concatenation setting information stored in the storing part and sending the first concatenation setting information with the respective identifier to another transmission apparatus in response to receiving a predetermined command; and

a part receiving second concatenation setting information from another transmission apparatus, writing respective concatenation setting information into the received second concatenation setting information, and sending the second concatenation setting information to another transmission apparatus.

7. (currently amended) A concatenation setting method in a transmission apparatus used for forming a ring network that supports a bidirectional ring switching capability, the method comprising the steps of:

detecting a ring switching request from a received signal, including identifiers of transmission apparatuses between which a failure occurs, wherein the ring switching request is sent from one of the transmission apparatuses that detects the failure, and at least one of the transmission apparatuses performs line switching after receiving the ring switching request that goes around the ring network;

storing the concatenation setting information table that includes concatenation setting information for each identifier of transmission apparatuses forming the network;

obtaining an identifier from the ring switching request and concatenation setting information, corresponding to the identifier, from the concatenation setting information table;

making a concatenation setting for a protection line according to the concatenation

setting information;

detecting a concatenation setting in the transmission apparatus; and

adding the respective identifier of the transmission apparatus to concatenation setting information corresponding to the concatenation setting and sending the concatenation setting information with the respective identifier to another transmission apparatus by using available bits in an undefined region in an overhead of a signal transmitted over the ring network, wherein the concatenation setting information is for connecting basic unit signals transmitted over the ring network.

8. (cancelled)

9. (original) The method as claimed in claim 7, wherein the transmission apparatus obtains the concatenation setting information from information received from another transmission apparatus.

10. (cancelled)

11. (previously presented) The method as claimed in claim 7, wherein, when the respective identifier is changed, the transmission apparatus adds the changed identifier to the concatenation setting information and sends the concatenation setting information with the changed identifier to another transmission apparatus.

12. (previously presented) The method as claimed in claim 7, the method further comprising: adding the respective identifier to first concatenation setting information stored in the storing part and sending the first concatenation setting information with the respective identifier to another transmission apparatus in response to receiving a predetermined command; and receiving second concatenation setting information from another transmission apparatus, writing respective concatenation setting information into the received second concatenation setting information, and sending the second concatenation setting information to another transmission apparatus.